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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/904,864	07/16/2001	Tatsuya Nishio	1114-168	5462

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EXAMINER

TRAN, NGHI V

ART UNIT

PAPER NUMBER

2151

DATE MAILED: 09/17/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	Application No.	Applicant(s)
	09/904,864	NISHIO ET AL.
	Examiner Nghi V Tran	Art Unit 2151

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) Responsive to communication(s) filed on 16 July 2001.  
 2a) This action is **FINAL**.                            2b) This action is non-final.  
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) Claim(s) 1-10 is/are pending in the application.  
 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.  
 5) Claim(s) \_\_\_\_\_ is/are allowed.  
 6) Claim(s) 1-10 is/are rejected.  
 7) Claim(s) 4 is/are objected to.  
 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) The specification is objected to by the Examiner.  
 10) The drawing(s) filed on \_\_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  
 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
 a) All    b) Some \* c) None of:  
 1. Certified copies of the priority documents have been received.  
 2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- 1) Notice of References Cited (PTO-892)  
 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)  
 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
 Paper No(s)/Mail Date 7/16/01.
- 4) Interview Summary (PTO-413)  
 Paper No(s)/Mail Date. \_\_\_\_\_.  
 5) Notice of Informal Patent Application (PTO-152)  
 6) Other: \_\_\_\_\_.

## **DETAILED ACTION**

### ***Specification***

1. The lengthy specification has not been checked to the extent necessary to determine the presence of all possible minor errors. Applicant's cooperation is requested in correcting any errors of which applicant may become aware in the specification.
2. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

The following title is suggested: "Communication apparatus for transmitting, receiving, and printing an electronic mail with memory overflow condition."

### ***Claim Objections***

3. Claim 4 is objected to because of the following informalities: a word "rerequest" appears to be incorrect. Appropriate correction is required.

### ***Claim Rejections - 35 USC § 112***

4. The following is a quotation of the second paragraph of 35 U.S.C. 112:  
  
The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
5. Claim 4 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Regarding claim 4, the phrase "or the like" renders the claim(s) indefinite because the claim(s) include(s) elements not actually disclosed (those encompassed by

"or the like"), thereby rendering the scope of the claim(s) unascertainable. See MPEP § 2173.05(d).

***Claim Rejections - 35 USC § 103***

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

7. Claims 1-3, 5-10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kuroda et al., U.S. Patent Number 5,732,161 (hereinafter Kuroda) in view of Lu et al., U.S. Patent Number 6,473,815 (hereinafter Lu).

Taking claim 1 as an exemplary claim, Kuroda discloses a communication apparatus connected to a network, capable of transmitting and receiving an electronic mail comprising:

- memory means (item 9 of figure 1) for storing received data (column 2, line 54 to column 3, line 4); and
- control means (item 10 of figure 1) for controlling so that, when the memory means (item 9 of figure 1).

However, Kuroda fails to teach a memory overflow condition during data reception. Lu discloses a memory overflow condition during data reception, the communication apparatus is disconnected from a communication path and data received and stored in the memory means (items 304, 306, or 308) is processed, and when the memory means recovers from the memory overflow condition and a free area is formed in the

memory means, a transmission side is automatically called for the communication apparatus to restart the data reception (figure 4 and figure 8). It would have been obvious to one having ordinary skill in the art, at the time of invention was made to modify Kuroda in view of Lu by adding the memory overflow condition as discussed above. The motivation for doing so would have been obvious because the memory overflow increases the transmission quality and reduces end-to-end delay (see Lu, column 2, lines 21-26).

With respect to claim 2, Kuroda further discloses notifying means (items 301 and DSP) for, when the memory means reaches the memory overflow condition, notifying a user of the memory overflow condition by a voice message or a display, so as to make recovery of the memory means from the memory overflow condition.

With respect to claim 3, Kuroda fails to disclose a delete signal for erasing the relevant data stored in a server as a transmission side is sent. In a communication apparatus, Lu further discloses a delete signal for erasing the relevant data stored in a server as a transmission side is sent when the memory means for storing received data reaches the memory overflow condition and the communication apparatus is disconnected from the communication path (figure 8). It would have been obvious to one having ordinary skill in the art, at the time of invention was made to modify Kuroda in view of Lu by dropping data packet when the memory overflow is high or full. The motivation for doing so would have been obvious because the buffer threshold is so high or full that cause the system to slow or completely shut down (see Lu, figure 8, and column 7, line 54 to column 8, line 12).

With respect to claim 5, claim 5 calls for an additional limitation of a printer. Kuroda further discloses printing means (item 2 of figure 1) for printing the received data on a recording sheet and when data reception is restarted, received data is stored in the memory means (item 9 of figure 1), and the stored data in the memory means is read out to print on a recording sheet by the printing means (figure 1, figure 8, and column 1, lines 44-57). Therefore, claim 5 is also rejected for the same reasons set forth in claim 1.

With respect to claim 6, Kuroda further teaches the control means controls so that, when the data reception is interrupted, and the data stored in the memory means by the data reception is printed on the recording sheet, a data portion printed on a recording sheet by the printing means is stored in the memory, and when data reception is restarted, the data stored in the memory means by the data reception is compared with data already stored in the memory means and data except for the data portion already printed on the recording sheet on the recording sheet is printed on a recording sheet (figure 1 and figure 8).

Claims 7-10 are also rejected for the same reasons set forth in claims 1-3 and 5-6.

8. Claim 4 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kuroda and Lu as applied to claim 1 above, and further in view of Wing, U.S. Patent Number 6,650,440.

With respect to claim 4, both Kuroda and Lu fail to teach when data is not provided because of busyness as calling results of a request of data, recalling is

repeatedly performed with predetermined timing. The limitation regarding memory overflow condition and the communication apparatus is disconnected from the communication path has been discussed above under Lu's reference. In a communication apparatus, Wing teaches recalling is repeatedly performed with predetermined timing when data is not provided because of busyness as calling results of a request of data (figure 3-4). It would have been obvious to one having ordinary skill in the art, at the time of invention was made to modify Kuroda and Lu in view of Wing by specifying data with predetermined timing. The motivation for doing so would have been obvious because a predetermined length of time increases the changes of reliable and reduces the memory overflow (see Wing, column 9, lines 21-58, and figures 3-4).

### ***Conclusion***

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

- a. "Email to fax processing when no secondary storage is available," U.S. Patent Number 6,600,750, by Joffe et al.
- b. "System for printing facsimile jobs with a property profile," U.S. Patent Number 6,657,742, by Kassmann.
- c. "System for managing resource deficient jobs in multifunctional printing system," U.S. Patent Number 6,504,621, by Salgado.
- d. "Method and apparatus for automatically handling faxes," U.S. Patent Number 6,721,059, by Sturgeon et al.
- e. "Network facsimile apparatus," U.S. Patent Number 6,785,023, by Iida.

f. "Printing apparatus, information processing apparatus, data processing method for use in such an apparatus, and storage medium storing computer-readable program," U.S. Patent Number 6,538,764, by Ueda.

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Nghi V Tran whose telephone number is (571) 272-4067. The examiner can normally be reached on Monday-Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Zarni Maung can be reached on (571) 272-3939. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Nghi V Tran  
Examiner  
Art Unit 2151

NT



FRANTZ B. JEAN  
PRIMARY EXAMINER